

7. ACRONYMS

Acronyms defined and used only once in the text may not be included in this list.

ACAM	Airborne Compact Atmospheric Mapper
ACS	American Chemical Society
ADEOS	ADvanced Earth Observing Satellite
AERONET	Aerosol Robotic Network
AEWs	African Easterly Wave(s)
AFB	Air Force Base
AGU	American Geophysical Union
AI	Aerosol Index
AIAA	American Institute of Aeronautics and Astronautics, Inc.
AIM	Aeronomy of Ice in the Mesosphere
AIRS	Atmospheric Infrared Sounder
AMS	American Meteorological Society
AMSR	Advanced Microwave Scanning Radiometer
AMSR-E	AMSR Earth Observing System (EOS)
AMSU	Advanced Microwave Sounding Unit
AOD	Aerosol Optical Depth
APSATS	Asia Pacific Satellite Training Seminar
ARM	Atmospheric Radiation Measurement (Program)
ARM CART	ARM Cloud and Radiation Test Bed
AROTAL	Airborne Raman Ozone, Temperature, and Aerosol Lidar
ASP/DOE	Atmospheric Sciences Program/Department of Energy
ATL	Aerosol and Temperature Lidar
ATMS	Advanced Technology Microwave Sounder
AVE	Aura Validation Experiment
BASE-ASIA	Biomass-burning Aerosols in South East-Asia: Smoke Impact Assessment
BUV	Backscatter Ultraviolet
CALIPSO	Cloud-Aerosol Lidar and Infrared Pathfinder Satellite Observations
CAMEX	Convection And Moisture EXperiment
CAR	Cloud Absorption Radiometer
CCN	Cloud Condensation Nuclei
CCSP	Climate Change Science Program
CC-VEx	CALIPSO-CloudSat Validation Experiment
CERES	Clouds and the Earth's Radiant Energy System
CFCs	Chlorofluorocarbons
CGCM	Chemistry and General Circulation Model
CMOS	Complementary metal–oxide–semiconductor
COMBO	Combined Stratospheric-Tropospheric Model
COMMIT	Chemical, Optical, and Microphysical Measurements of <i>In situ</i> Troposphere
COVIR	Compact Visible and Infrared Radiometer
CP	Convective Parameterization
CPL	Cloud Physics Lidar
CR-AVE	Costa Rica AVE
CrIS	Crosstrack Infrared Sounder

ACRONYMS

CRS	Cloud Radar System
CSTEA	Center for the Study of Terrestrial and Extraterrestrial Atmospheres
CTM	Chemical Transport Model
DAAC	Distributed Active Archive Center
DFRC	Dryden Flight Research Center
DOAS	Differential Optical Absorption Spectroscopy
DOE	Department of Energy
DSCOVR	Deep Space Climate Observatory Project (formerly Triana)
DU	Dobson Unit
ECMWF	European Centre for Medium-Range Weather Forecasts
EDOP	ER-2 Doppler Radar
ENSO	El Niño Southern Oscillation
EnviSat	Environmental Satellite
EOS	Earth Observing System
EPA	Environmental Protection Agency
EPIC	Earth Polychromatic Imaging Camera
EP-TOMS	Earth Probe TOMS
ESE	Earth Science Enterprise
ESD	Earth Sciences Division
ESMF	Earth Science Modeling Framework
ESRL	Earth System Research Laboratory (NOAA)
ESSIC	Earth System Science Interdisciplinary Center
ESTO	Earth Science Technology Office
EU	European Union
FMI-ARC	Finnish Meteorological Institute – Arctic Research Center
FOV	Field of View
fvGCM	Finite volume GCM
GCE	Goddard Cumulus Ensemble model
GCM	General Circulation Model
GEOS	Goddard Earth Observing System
GeoSpec	Geostationary Spectrograph
GEOSS	Global Earth Observation System of Systems
GEST	Goddard Earth Sciences and Technology Center
GEWEX	Global Energy and Water Cycle Experiment
GFDL	Geophysical Fluid Dynamics Laboratory
GISS	Goddard Institute for Space Studies
GLAS	Geoscience Laser Altimeter System
GLOBE	Global Learning and Observations to Benefit the Environment
GLOW	Goddard Lidar Observatory for Winds
GMAO	Global Modeling and Assimilation Office
GMI	Global Modeling Initiative
GMT	Greenwich Mean Time
GMU	George Mason University
GOCART	Goddard Chemistry Aerosol Radiation and Transport
GOES	Geostationary Operational Environmental Satellite
GOME	Global Ozone Monitoring Experiment

GPCP	Global Precipitation Climatology Project
GPM	Global Precipitation Measurement
GPS	Global Positioning System
GSFC	Goddard Space Flight Center
GSSP	Graduate Student Summer Program
GSPW	Global Soil Wetness Project
GV	Ground Validation
GVP	Ground Validation Program
HARLIE	Holographic Airborne Rotating Lidar Instrument Experiment
HBCUs	Historically Black Colleges and Universities
HIP	High school Internship Program
HIRDLS	High Resolution Dynamics Limb Sounder
HIRS	High Resolution Infrared Sounder
HIWRAP	High-Altitude Imaging Wind and Rain Airborne Profiler
HSB	Humidity Sounder Brazil
HU	Howard University
HUPAS	Howard University Program in Atmospheric Sciences
HY-SiB	Hydrology and Simple Biosphere
ICESat	Ice, Cloud, and Land Elevation Satellite
IIP	Instrument Incubator Program
INTEX-B	Intercontinental Chemical Transport Experiment – Part B
IPCC	Intergovernmental Panel on Climate Change
IPO	Integrated Program Office
JAXA	Japan Aerospace Exploration Agency
JCET	Joint Center for Earth Systems Technology
JGR	Journal of Geophysical Research
JPL	Jet Propulsion Laboratory
JSC	Johnson Space Center
KILT	Kiritimati Island Lidar Trailer
L2-SVIP	Lagrange-2 Solar Viewing Interferometer Prototype
LaRC	Langley Research Center
LIS	Land Information System
LRR	Lightweight Rainfall Radiometer
LRR-X	LRR-X band
MAPB	Mesoscale Atmospheric Processes Branch
MAS	MODIS Airborne Simulator
McRAS	Microphysics of Clouds with the Relaxed Arakawa-Schubert Scheme
MDE	Maryland Department of the Environment
MFRSR	Multifilter Rotating Shadowband Radiometer
MILAGRO	Megacity Initiative: Local And Global Research Observations
MISR	Multi-Angle Imaging Spectroradiometer
MIT	Massachusetts Institute of Technology
MLS	Microwave Limb Sounder
MM5	Mesoscale Model 5

ACRONYMS

MODIS	Moderate Resolution Imaging Spectroradiometer
MOHAVE	Measurements Of Humidity in the Atmosphere and Validation Experiment
MPL	Micro-Pulse Lidar
MPLNET	Micro-Pulse Lidar Network
MSU	Microwave Sounding Unit
NAMMA	NASA African Monsoon Multidisciplinary Analysis
NASA	National Aeronautics and Space Administration
NASDA	National Space Development Agency (Japan)
NATIVE	Nittany Atmospheric Trailer and Integrated Validation Experiment
NCAR	National Center for Atmospheric Research
NCEP	National Center for Environmental Prediction
NICT	National Institute of Information and Communications Technology
NIIEM	Russian Scientific Research Institute of Electromechanics
NIR	Near Infrared
NIST	National Institute of Standards and Technology
NMNH	National Museum of Natural History
NOAA	National Oceanic and Atmospheric Administration
NPOESS	National Polar Orbiting Environmental Satellite System
NPP	NPOESS Preparatory Project
NRC	National Research Council
NSF	National Science Foundation
NSIDC	National Snow and Ice Data Center
NWS	National Weather Service
OLR	Outgoing Longwave Radiation
OMI	Ozone Monitoring Instrument
OMPS	Ozone Mapper and Profiler System
OOAT	Ozone Operational Algorithm Team
PAVE	Polar Aura Validation Experiment
PBL	Planetary Boundary Layer
PI	Principal Investigator
PM2.5	Particulate Matter, diameter < 2.5 μm
PMC	Polar Mesospheric Clouds
POES	Polar Orbiting Environmental Satellite
QuikSCAT	(NASA's) Quick Scatterometer satellite
RASL	Raman Airborne Spectroscopic Lidar
RCDF	Radiometric Calibration and Development Facility
RMS	Root Mean Squared
RRS	Radiosonde Replacement System
SAGE	Stratospheric Aerosol and Gas Experiment
SBIR	Small Business Innovative Research
SAL	Saharan Air Layer
SAOZ	Système d'Analyse par Observation Zénithal
SAUNA	Sodankylä Total Column Ozone Intercomparison
SBUV	Solar Backscatter Ultraviolet

SBUV/2	Solar Backscatter Ultraviolet/version 2
SDS	Scientific Data Set
SEB	Source Evaluation Board
SESI	Scientific and Engineering Student Internship program
SGT	Stinger Ghaffarian Technologies
ShADOE	Shared Aperture Diffractive Optical Element (telescope)
SHADOZ	Southern Hemisphere ADDitional OZonesondes
SMART	Surface-sensing Measurements for Atmospheric Radiative Transfer
SOLSE/LORE	Shuttle Ozone Limb Sounding Experiment/Limb Ozone Retrieval Experiment
SOLVE	SAGE III Ozone Loss and Validation Experiment
SORCE	SOlar Radiation and Climate Experiment
SRL	Scanning Raman Lidar
SSAI	Science Systems and Applications, Inc.
STEM	Science, Technology, Engineering, and Mathematics
STROZ LITE	Stratospheric Ozone Lidar Trailer Experiment
STS	Space Transportation System
SVIP	Solar Viewing Interferometer Prototype
TCSP	Tropical Cloud Systems and Processes
TES	Tropospheric Emission Spectrometer
THOR	cloud THickness from Offbeam Returns
TIROS	Television Infrared Observation Satellite
TOA	Top Of Atmosphere
TOGA-COARE	Tropical Ocean Global Atmosphere–Coupled Ocean Atmosphere Response Experiment
TOMS	Total Ozone Mapping Spectrometer
TOVS	TIROS Operational Vertical Sounder
TRMM	Tropical Rainfall Measuring Mission
TWiLiTE	Tropospheric Wind Lidar Technology Experiment
TWP-ICE	Tropical Warm Pool International Cloud Experiment
UAE2	United Arab Emirates Unified Aerosol Experiment
UARS	Upper Atmosphere Research Satellite
UAV	Unmanned Aerial Vehicle
UMBC	University of Maryland, Baltimore County
UMCP	University of Maryland, College Park
UNH	University of New Hampshire
URAD	UAV Radar
USDA	United States Department of Agriculture
UTC	Universal Coordinated Time
UV	Ultraviolet
UV-B	Ultraviolet-B radiation
UV-MFRSR	Ultraviolet Multifilter Rotating Shadowband Radiometer
VIS	Visible
WAVES	Water Vapor Validation Experiment – Satellite/Sondes
WCRP	World Climate Research Programme
WMI	Weather Modification Inc. ???

ACRONYMS

WMO	World Meteorological Organization
WRF	Weather Research and Forecasting